

### Abstract of the Disclosure

A method and apparatus for combining video graphics processing and audio processing onto the same single chip and/or printed circuit board includes a graphics processing circuit, an audio processing circuit, a local bus, and a bus arbitrator. The local bus couples both the graphics processing circuit and audio processing circuit to the system bus such that each of the circuits may transceive data with the system bus. The bus arbitrator arbitrates access to the local bus between the graphics processing circuit and audio processing circuit. Such arbitration is based on incoming data, which is interpreted and, based on the interpretation, the bus arbitrator routes the incoming data to either the graphics processing circuit or the audio processing circuit. In addition, the bus arbitrator arbitrates outputting data from the graphics processing circuit and the audio processing circuit based on commands received from the CPU.